

### REMARKS

Favorable reconsideration of this application, in light of the present amendments and following discussion, is respectfully requested.

Claims 1-7 and 9-20 are pending; Claims 9-11, 14, and 20 are amended; and Claim 8 is canceled. It is respectfully submitted that no new matter is added herewith, as support for the amendment for Claim 9 may be found, for example, at page 50, line 2 through page 52, line 13 of the specification, support for Claim 11 may be found at page 31, lines 6-25, and support for Claim 14 may be found, for example, in the specification at page 19, line 27-page 20, line 10. The amendment to Claim 20 addresses a minor matter of form.

In the outstanding Office Action, Claims 1-14 and 16-20 were rejected under 35 U.S.C. § 102(b) as anticipated by Sakai et al. (U.S. Pat. No. 5,162,819); and Claim 15 was rejected under 35 U.S.C. § 103(a) as unpatentable over Sakai in view of Tanaka et al. (U.S. Pat. No. 6,614,746, hereafter Tanaka).

Regarding the rejection of Claims 1-14 and 16-20 under 35 U.S.C. § 102(b) as anticipated by Sakai, that rejection is respectfully traversed.

Claim 1 recites, in part, a recording layer ... and a photoconductive layer formed on the recording layer.

Through the configuration recited in Claim 1, it is easier to manufacture a recording medium having a smooth surface. Additionally, the photoconductive layer functions as a protective layer to protect the recording layer, and functions as a lubricating film for decreasing the friction coefficient between the recording medium and the recording head.<sup>1</sup>

Figure 1 of Sakai illustrates a recording medium 14. Sakai describes that the recording medium 14 was formed to have a laminated structure comprising an underlying

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<sup>1</sup> Specification, page 24, line 23-page 25, line 5.

electrode 9, a photoconductive thin film 10, and an insulating thin film 11. As illustrated in Figure 1, the photoconductive thin film 10 is one of the components of the recording medium.<sup>2</sup>

Additionally, the recording medium 14 of Figure 1 of Sakai shows that the photoconductive thin film 10 is located between the substrate 8 and the insulating thin film 11. Therefore, even assuming *arguendo* that the recording layer consists only of the insulating thin film 11, the recording medium 14 shown in Figure 1 of Sakai is still not provided with a photoconductive layer formed on the recording layer, as recited in Claim 1. The recording mediums shown in Figures 2-4 of Sakai suffer from the defects identified with regard to the recording medium 14 of Figure 1 of Sakai.

Accordingly, it is respectfully submitted that Claim 1 and dependent Claims 2-7 patentably distinguish over Sakai.

Claim 9, from which Claim 10 depends, recites, in part: an electrically insulating region which electrically insulates the plural charge accumulating regions from each other and is provided with a plurality of through-holes, the through-holes being filled with the charge accumulating regions.

Through the configuration of Claim 9, it is possible to equalize the dimensions of the charge accumulating regions relative to each other, to regularly arrange the charge accumulating regions, and to form a smooth surface.

In the recording medium 14 illustrated in Figure 1 and 3 of Sakai, the boundary 12 between the photoconductive thin film 10 and the insulation thin film 11 functions as the electric charge accumulating region. Furthermore, both the conductive thin film 10 and the insulating thin film 11 are continuous films. In other words, although the recording medium

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<sup>2</sup> Sakai, col. 6, lines 48-52.

14 of Figures 1 and 3 of Sakai is provided with one electric charge accumulating region, it is not provided with a plurality of electric charge accumulating regions.

Additionally, the recording medium 14 in Figure 2 of Sakai is provided with a grain-like semiconductor thin film 17. Sakai describes that the grain boundaries 18 exist between the microstructures.<sup>3</sup> The grain like semiconductor thin film 17 and the grain boundaries 18 are obtained by forming an ultra-fine silicon particle film by plasma-CVD and oxidizing the surfaces of the ultra-fine particles.<sup>4</sup> Therefore, the grain boundaries 18 are formed of insulators. However, the insulator 18 must cover both the side surface of the microstructure and the upper surface of the microstructure.

Therefore, as Sakai fails to disclose or suggest an electrically insulating region which electrically insulates the plural charge accumulating regions from each other and is provided with a plurality of through-holes, the through-holes being filled with the charge accumulating regions, as recited in Claim 9, it is respectfully submitted that Claim 9 patentably distinguishes over Sakai. Likewise, it is respectfully submitted that dependent Claim 10 patentably distinguishes over Sakai for the reasons above-noted with regard to Claim 9.

Claim 11, as amended, recites a recording layer overlying the substrate and comprising an electrically insulating region, a plurality of charge accumulating regions dispersed in the electrically insulating region and ... a plurality of photoconductive regions dispersed in the electrically insulating regions ....

As earlier explained, none of the recording media shown in Figures 1-6 of Sakai includes these features. Accordingly, it is respectfully submitted that Claims 11-13 patentably distinguish over Sakai.

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<sup>3</sup> Sakai, col. 8, lines 44-45.

<sup>4</sup> Id. at col. 8, lines 37-44.

With regard to Claims 14 and 20, Claim 14 recites a recording head arranged to face the main surface of the recording medium and comprising a light emitting section emitting light toward the recording layer when writing information. Similarly, Claim 20 recites injecting an electric charge into the charge accumulating region via a portion of the photoconductor region irradiated with light.

According to Sakai, light irradiation is not used for recording and reproduction but is used for erasing information.<sup>5</sup> Accordingly, it is respectfully submitted that Claims 14 and 16-20 patentably distinguish over Sakai.

Consequently, as Sakai fails to disclose or suggest the features of Claims 1-7, 9-14, and 16-20, it is respectfully requested that this rejection be withdrawn.

With regard to the rejection of Claim 15 under 35 U.S.C. § 103(a) as unpatentable over Sakai in view of Tanaka, that rejection is respectfully traversed.

Claim 15 depends from Claim 14. As earlier explained, Sakai fails to disclose or suggest the features of Claim 14. As Tanaka is not relied upon to provide the features noted as deficient within Sakai, Tanaka is not substantively addressed herewith.

Additionally, it is respectfully submitted that the combination of Sakai and Tanaka is not supported by the teachings of either reference. More specifically, as earlier explained, Sakai does not disclose or suggest using light irradiation for recording. Therefore, as Sakai does not relate to recording, "performing a high density recording," as suggested in the Office Action, could not motivate a person skilled in the art to incorporate the use of a near-field light as described in Tanaka to the optical recording apparatus of Sakai.

It is therefore respectfully requested that the outstanding rejection of Claim 15 under 35 U.S.C. § 103(a) be withdrawn.

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<sup>5</sup> Id. at col. 8, lines 56-59, col. 9, lines 13-66, col. 10, lines 5-7, and col. 2, lines 16-44.

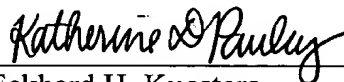
Consequently, in view of the foregoing discussion and present amendments, it is respectfully submitted that this application is in condition for allowance. An early and favorable action is therefore respectfully requested.

Respectfully submitted,

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